

Connecting via Winsock to STN

Welcome to STN International! Enter x:X

LOGINID:SSPTATDH1621

PASSWORD:

TERMINAL (ENTER 1, 2, 3, OR ?):2

\* \* \* \* \* Welcome to STN International \* \* \* \* \*

NEWS 1 Web Page for STN Seminar Schedule - N. America  
NEWS 2 DEC 01 ChemPort single article sales feature unavailable  
NEWS 3 APR 03 CAS coverage of exemplified prophetic substances  
enhanced  
NEWS 4 APR 07 STN is raising the limits on saved answers  
NEWS 5 APR 24 CA/CAPLUS now has more comprehensive patent assignee  
information  
NEWS 6 APR 26 USPATFULL and USPAT2 enhanced with patent  
assignment/reassignment information  
NEWS 7 APR 28 CAS patent authority coverage expanded  
NEWS 8 APR 28 ENCOMPLIT/ENCOMPLIT2 search fields enhanced  
NEWS 9 APR 28 Limits doubled for structure searching in CAS  
REGISTRY  
NEWS 10 MAY 08 STN Express, Version 8.4, now available  
NEWS 11 MAY 11 STN on the Web enhanced  
NEWS 12 MAY 11 BEILSTEIN substance information now available on  
STN Easy  
NEWS 13 MAY 14 DGENE, PCTGEN and USGENE enhanced with increased  
limits for exact sequence match searches and  
introduction of free HIT display format  
NEWS 14 MAY 15 INPADOCDB and INPAFAMDB enhanced with Chinese legal  
status data  
NEWS 15 MAY 28 CAS databases on STN enhanced with NANO super role in  
records back to 1992  
NEWS 16 JUN 01 CAS REGISTRY Source of Registration (SR) searching  
enhanced on STN

NEWS EXPRESS MAY 26 09 CURRENT WINDOWS VERSION IS V8.4,  
AND CURRENT DISCOVER FILE IS DATED 06 APRIL 2009.

NEWS HOURS STN Operating Hours Plus Help Desk Availability  
NEWS LOGIN Welcome Banner and News Items

Enter NEWS followed by the item number or name to see news on that  
specific topic.

All use of STN is subject to the provisions of the STN customer  
agreement. This agreement limits use to scientific research. Use  
for software development or design, implementation of commercial  
gateways, or use of CAS and STN data in the building of commercial  
products is prohibited and may result in loss of user privileges  
and other penalties.

\* \* \* \* \* STN Columbus \* \* \* \* \*

FILE 'HOME' ENTERED AT 16:59:48 ON 23 JUN 2009

=> FILE CAPLYS

'CAPLYS' IS NOT A VALID FILE NAME

SESSION CONTINUES IN FILE 'HOME'

Enter "HELP FILE NAMES" at an arrow prompt (=>) for a list of files that are available. If you have requested multiple files, you can specify a corrected file name or you can enter "IGNORE" to continue accessing the remaining file names entered.

=> FILE CAPLUS

=> FILE CAPLUS

=> S NESPER R?/AU  
L10 240 NESPER R?/AU

=> S GRUTZMACHER H?/AU  
L11 95 GRUTZMACHER H?/AU

=> S HABREACHT J?/AU  
L12 0 HABREACHT J?/AU

=> S HABERECHT J?/AU  
L13 13 HABERECHT J?/AU

=> D L13 1-13

L13 ANSWER 1 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN  
AN 2008:19348 CAPLUS Full-text  
DN 150:214505  
TI Hydrosilylation of ethynylborazines and their use for the formation of a highly functionalized silica gel  
AU Haberecht, J.; Ruegger, H.; Nesper, R.; Grutzmacher, H.  
CS ETH Honggerberg-HCI H131, ETH Zurich, Zurich, CH-8093, Switz.  
SO Organosilicon Chemistry VI: From Molecules to Materials, [European Silicon Days], 2nd, Munich, Germany, Sept. 11-12, 2003 (2005), Meeting Date 2003, Volume 1, 142-147. Editor(s): Auner, Norbert; Weis, Johann. Publisher: Wiley-VCH Verlag GmbH & Co. KGaA, Weinheim, Germany.  
CODEN: 69KGTM; ISBN: 978-3-527-31214-6  
DT Conference  
LA English  
OS CASREACT 150:214505  
RE.CNT 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L13 ANSWER 2 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN  
AN 2008:16645 CAPLUS Full-text  
DN 148:361201  
TI New approaches and characterization methods of functional silicon-based non-oxidic ceramics  
AU Haberecht, J.; Krumeich, F.; Hametner, K.; Gunther, D.; Nesper, R.  
CS ETH Zurich, Zurich, CH-8093, Switz.  
SO Organosilicon Chemistry VI: From Molecules to Materials, [European Silicon Days], 2nd, Munich, Germany, Sept. 11-12, 2003 (2005), Meeting Date 2003, Volume 2, 981-986. Editor(s): Auner, Norbert; Weis, Johann. Publisher: Wiley-VCH Verlag GmbH & Co. KGaA, Weinheim, Germany.  
CODEN: 69KGTM; ISBN: 978-3-527-31214-6  
DT Conference  
LA English  
RE.CNT 7 THERE ARE 7 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L13 ANSWER 3 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN  
AN 2005:461923 CAPLUS Full-text  
DN 143:137485

TI Carbon nanostructures on high-temperature ceramics - a novel composite material and its functionalization  
 AU Haberecht, Joerg; Krumeich, F.; Stalder, M.; Nesper, Reinhard  
 CS Laboratory of Inorganic Chemistry, ETH Zuerich, Zurich, CH-8093, Switz.  
 SO Catalysis Today (2005), 102-103, 40-44  
 CODEN: CATTEA; ISSN: 0920-5861  
 PB Elsevier B.V.  
 DT Journal  
 LA English

RE.CNT 24 THERE ARE 24 CITED REFERENCES AVAILABLE FOR THIS RECORD  
 ALL CITATIONS AVAILABLE IN THE RE FORMAT

L13 ANSWER 4 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN  
 AN 2005:304935 CAPLUS Full-text  
 DN 143:11736  
 TI A Construction Kit for Si-B-C-N Ceramic Materials Based on Borazine Precursors  
 AU Haberecht, Joerg; Nesper, Reinhard; Gruetzmacher, Hansjoerg  
 CS Laboratory of Inorganic Chemistry, ETH Zuerich, Zurich, CH-8093, Switz.  
 SO Chemistry of Materials (2005), 17(9), 2340-2347  
 CODEN: CMATEX; ISSN: 0897-4756  
 PB American Chemical Society  
 DT Journal  
 LA English

RE.CNT 43 THERE ARE 43 CITED REFERENCES AVAILABLE FOR THIS RECORD  
 ALL CITATIONS AVAILABLE IN THE RE FORMAT

L13 ANSWER 5 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN  
 AN 2004:675701 CAPLUS Full-text  
 DN 141:178208  
 TI Method for production of a B/N/C/Si ceramic from a borazine precursor for making heating  
 IN Nesper, Reinhard; Haberecht, Joerg; Gruetzmacher, Hansjoerg  
 PA Eidgenossische Technische Hochschule Zuerich, Switz.  
 SO PCT Int. Appl., 24 pp.  
 CODEN: PIXXD2  
 DT Patent  
 LA German  
 FAN.CNT 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI WO 2004069768	A1	20040819	WO 2004-CH52	20040202
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI				
RW: BW, GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
EP 1590310	A1	20051102	EP 2004-707180	20040202
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK				
US 20060293164	A1	20061228	US 2005-544211	20050802
FRAI CH 2003-149	A	20030203		
WO 2004-CH52	W	20040202		

RE.CNT 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD  
 ALL CITATIONS AVAILABLE IN THE RE FORMAT

L13 ANSWER 6 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN

AN 2004:36188 CAPLUS Full-text  
 DN 140:221686  
 TI High-Yield Molecular Borazine Precursors for Si-B-N-C Ceramics  
 AU Haberecht, Joerg; Krumeich, Frank; Gruetzmacher, Hansjoerg;  
 Nesper, Reinhard  
 CS Laboratory of Inorganic Chemistry, ETH Zurich, Zurich, CH-8093, Switz.  
 SO Chemistry of Materials (2004), 16(3), 418-423  
 CODEN: CMATEX; ISSN: 0897-4756  
 PB American Chemical Society  
 DT Journal  
 LA English  
 RE.CNT 52 THERE ARE 52 CITED REFERENCES AVAILABLE FOR THIS RECORD  
 ALL CITATIONS AVAILABLE IN THE RE FORMAT

L13 ANSWER 7 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN  
 AN 2003:415725 CAPLUS Full-text  
 DN 140:42301  
 TI Functionalized borazines as precursors for new silica gels  
 AU Haberecht, Joerg; Krummland, Anja; Breher, Frank; Gebhardt,  
 Bjoern; Rueeggler, Heinz; Nesper, Reinhard; Gruetzmacher, Hansjoerg  
 CS Department of Chemistry, ETH-Hoenggerberg, Zurich, CH-8093, Switz.  
 SO Dalton Transactions (2003), (11), 2126-2132  
 CODEN: DTRAF; ISSN: 1477-9226  
 PB Royal Society of Chemistry  
 DT Journal  
 LA English  
 OS CASREACT 140:42301  
 RE.CNT 32 THERE ARE 32 CITED REFERENCES AVAILABLE FOR THIS RECORD  
 ALL CITATIONS AVAILABLE IN THE RE FORMAT

L13 ANSWER 8 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN  
 AN 2002:927350 CAPLUS Full-text  
 DN 138:7468  
 TI Synthesis of novel lamellar-structured silicon sub-nitride used as  
 sub-nano-transistor  
 IN Kniep, Ruediger; Haberecht, Joerg  
 PA Max-Planck-Gesellschaft Zur Foerderung Der Wissenschaften E.V., Germany  
 SO PCT Int. Appl., 27 pp.  
 CODEN: PIXXD2  
 DT Patent  
 LA German  
 FAN.CNT 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002096799	A2	20021205	WO 2002-EP5733	20020524
WO 2002096799	A3	20071129		
W: JP, US				
RW: AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, EP				
DE 10125629	A1	20021205	DE 2001-10125629	20010525
PRAI DE 2001-10125629	A	20010525		

L13 ANSWER 9 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN  
 AN 2002:13622 CAPLUS Full-text  
 DN 136:192012  
 TI Refinement of the crystal structure of iron dibromide, FeBr2  
 AU Haberecht, J.; Borrmann, H.; Kniep, R.  
 CS Chem. Phys. fester Stoffe, Max-Planck-Inst., Dresden, D-01187, Germany  
 SO Zeitschrift fuer Kristallographie - New Crystal Structures (2001), 216(4),  
 510

CODEN: ZKNSFT; ISSN: 1433-7266

PB R. Oldenbourg Verlag

DT Journal

LA English

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L13 ANSWER 10 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN

AN 2000:349782 CAPLUS Full-text

DN 133:266917

TI Salen-silicon complexes - a new type of hexacoordinate silicon

AU Haberecht, Jorg; Mucha, Frank; Bohme, Uwe; Roewer, Gerhard

CS Institut fur Anorganische Chemie Technische Universitat Bergakademie

Freiberg, Freiberg, D-09596, Germany

SO Organosilicon Chemistry IV: From Molecules to Materials, [Lectures and  
Poster Contributions presented at the Muechner Silicontage], 4th, Muechen,  
Apr., 1998 (2000), Meeting Date 1998, 500-504. Editor(s): Auner, Norbert;  
Weis, Johann. Publisher: Wiley-VCH Verlag GmbH, Weinheim, Germany.

CODEN: 68ZMAL

DT Conference

LA English

RE.CNT 12 THERE ARE 12 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L13 ANSWER 11 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN

AN 2000:269275 CAPLUS Full-text

DN 132:347333

TI 31P solid state nuclear magnetic resonance investigations on substituted  
ethylmercaptocyclotetraphosphazenes

AU Paasch, Silvia; Thomas, Berthold; Haberecht, Jorg; Bohme, Uwe;

Kruger, Kerstin

CS Department of Analytical Chemistry, Freiberg University of Mining and

Technology, Freiberg, D-09596, Germany

SO Phosphorus, Sulfur and Silicon and the Related Elements (1998), 141, 9-26

CODEN: PSSLEC; ISSN: 1042-6507

PB Gordon & Breach Science Publishers

DT Journal

LA English

RE.CNT 19 THERE ARE 19 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L13 ANSWER 12 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN

AN 2000:76243 CAPLUS Full-text

DN 132:173686

TI Crystal structure of N,N'-ethylenebis(3,5-di-tert-  
butylsalicylideneiminato)difluorosilane-dioxane (4/1),  
4C32H46F2N2O2Si.C4H8O2

AU Haberecht, J.; Bohme, U.; Lang, H.; Roewer, G.; Rheinwald, G.

CS Max-Planck-Institut Chemische Physik Fester Stoffe, Dresden, D-01257,  
Germany

SO Zeitschrift fuer Kristallographie - New Crystal Structures (2000), 215(1),  
135-137

CODEN: ZKNSFT; ISSN: 1433-7266

PB R. Oldenbourg Verlag

DT Journal

LA English

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L13 ANSWER 13 OF 13 CAPLUS COPYRIGHT 2009 ACS on STN

AN 1999:81805 CAPLUS Full-text  
DN 130:231388  
TI Hexacoordinate silicon-azomethine complexes. Synthesis, characterization,  
and properties  
AU Mucha, Frank; Haberecht, Joerg; Boehme, Uwe; Roewer, Gerhard  
CS Institut Anorganische Chemie, Technische Universitaet Bergakademie,  
Freiberg, D-09596, Germany  
SO Monatshefte fuer Chemie (1999), 130(1), 117-132  
CODEN: MOCMB7; ISSN: 0026-9247  
PB Springer-Verlag Wien  
DT Journal  
LA English  
RE.CNT 30 THERE ARE 30 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT





=> S US 2005-544211/AP  
L14 1 US 2005-544211/AP  
(US2005-544211/AP)

=> D L14

L14 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2009 ACS on STN  
AN 2004:675701 CAPLUS Full-text  
DN 141:178208  
TI Method for production of a B/N/C/Si ceramic from a borazine precursor for making heating  
IN Nesper, Reinhard; Haberecht, Joerg; Gruetzmacher, Hansjoerg  
PA Eidgenoessische Technische Hochschule Zuerich, Switz.  
SO PCT Int. Appl., 24 pp.  
CODEN: PIXXD2  
DT Patent  
LA German  
FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2004069768	A1	20040819	WO 2004-CH52	20040202
	W:	AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, RW: BW, GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG			
	EP 1590310	A1	20051102	EP 2004-707180	20040202
	R:	AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK			
	US 20060293164	A1	20061228	US 2005-544211	20050802 <--
PRAI	CH 2003-149	A	20030203		
	WO 2004-CH52	W	20040202		
RE.CNT	2	THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD ALL CITATIONS AVAILABLE IN THE RE FORMAT			

=> D RE

L14 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2009 ACS on STN  
RE  
(1) Anon; WO 0222625 A1 CAPLUS  
(2) Anon; DE 10108069 A1 CAPLUS

=> SET SMA OFF

SET COMMAND COMPLETED

=> SEL RAN.CAPLUS(1) L14 1

E1 THROUGH E1 ASSIGNED

=> SET SMA LOGIN

SET COMMAND COMPLETED

=> S E1

L15 1 "2002:220601"/AN

=> D L15 BIB,ABS

L15 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2009 ACS on STN

AN 2002:220601 CAPLUS Full-text

DN 136:247699

TI Preparation of (silylalkyl)boranes, (silylalkyl)borazines,  
oligoborocarbosilazanes, polyborocarbosilazanes and high  
temperature-stable silicon boron carbide nitride ceramics

IN Jansen, Martin; Jaeschke, Thomas

PA Max-Planck-Gesellschaft zur Foerderung der Wissenschaften E.V., Germany

SO PCT Int. Appl., 46 pp.

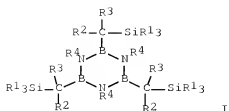
CODEN: PIXXD2

DT Patent

LA German

FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2002022625	A1	20020321	WO 2001-EP10540	20010912
	W:	AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW			
	RW:	GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG			
	DE 10045050	A1	20020321	DE 2000-10045050	20000912
	DE 10108069	A1	20020822	DE 2001-10108069	20010220
	AU 2001087731	A	20020326	AU 2001-87731	20010912
	CA 2421655	A1	20030307	CA 2001-2421655	20010912
	EP 1317463	A1	20030611	EP 2001-967334	20010912
	EP 1317463	B1	20050323		
	R:	AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR			
	JP 2004509127	T	20040325	JP 2002-526876	20010912
	AT 291580	T	20050415	AT 2001-967334	20010912
	ES 2236299	T3	20050716	ES 2001-967334	20010912
	US 20040039217	A1	20040226	US 2003-380553	20030312
	US 7148368	B2	20061212		
	US 20070063396	A1	20070322	US 2006-555934	20061102
	US 7342123	B2	20080311		
FRAI	DE 2000-10045050	A	20000912		
	DE 2001-10108069	A	20010220		
	US 2000-380553	A3	20000312		
	WO 2001-EP10540	W	20010912		
	US 2003-380553	A3	20030312		
OS	CASREACT 136:247699; MARPAT 136:247699				
GI					



AB (silylalkyl)boranes  $R_3SiC(R_1)(R_2)BR_2$  [ $R = H$ , halo, C1-20 hydrocarbyl,  $NR'R''$ ,  $OR'$ , where  $R'$ ,  $R'' = H$ , C1-20 hydrocarbyl;  $R_1$ ,  $R_2 = H$ , halo, C1-20 hydrocarbyl,  $NR'R''$ ,  $OR'$  (same  $R'$ ,  $R''$ )] are prepared by reaction of silanes  $R_3SiC(R_1)(R_2)X$  (same  $R-R_2$ ,  $X = \text{halogen}$ ), preferably  $R_3SiCH_2Cl$ , with a metal  $M$ , preferably  $Mg$ , at  $<50^\circ$  in an aprotic, organic solvent to give  $R_3SiC(R_1)(R_2)MX_w$  ( $w = 0$  when  $M = \text{monovalent metal}$ ;  $w = \text{whole number} \geq 1$  corresponding to the valence of  $M - 1$ , when  $M$  is a polyvalent metal), which then reacts at  $<50^\circ$  with a borane  $YBR_2$  (same  $R$ ;  $Y = \text{halo}$ ,  $NR'R''$ ,  $OR'$ , same  $R'$ ,  $R''$ ). Also claimed are (silylalkyl)borazines I [ $R_1 = H$ , halo, C1-20 hydrocarbyl,  $NR'R''$ ,  $OR'$ ;  $R'$ ,  $R'' = H$ , C1-20 hydrocarbyl;  $R_2$ ,  $R_3 = H$ , halo,  $NR'R''$ ,  $OR'$  (same  $R'$ ,  $R''$ );  $R_4 = R_1$ ,  $SnR^*3$ ,  $SiR^*3$ ,  $R^* = R_2$ , C1-20 hydrocarbyl] and their preparation from the corresponding  $R_3SiC(R_1)(R_2)BR_2$  and amines  $NR_43$  or ammonium salts  $HNR_43A^-$  (same  $R_4$ ;  $A = \text{anion}$ ), as are oligoborocarbosilazanes and polyborocarbosilazanes and their preparation from  $R_3SiC(R_1)(R_2)BR_2$  or borazines I, and also  $Si-B$  carbide nitride ceramics and their preparation from these compds. and  $NH_3$ . In an example, 7.0 g powdered  $Mg$  in 150 mL  $Et_2O$  is treated with 36.9 g  $Cl_3SiCH_2Cl$  in 200 mL  $Et_2O$ , then cooled to  $-78^\circ$  and treated with 23.3 g  $(EtO)_2BCl$  and filtered, whereupon the solvent is evaporated and the residue treated with 57.2 g  $BCl_3$  at  $-78^\circ$  and then with 0.5 g  $AlCl_3$  at room temperature to give  $Cl_3SiCH_2BCl_2$ ; reaction of this (silylalkyl)borane with  $MeNH_2$  in hexane gave a polyborocarbosilazane.

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

=> SET SMA OFF

SET COMMAND COMPLETED

=> SEL RAN.CAPLUS(2) L14 1

E2 THROUGH E2 ASSIGNED

=> SET SMA LOGIN

SET COMMAND COMPLETED

=> S E2

L16 1 "2002:220601"/AN

=> D L16 BIB,ABS

L16 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2009 ACS on STN

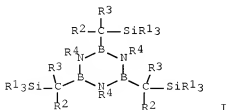
AN 2002:220601 CAPLUS Full-text

DN 136:247699

TI Preparation of (silylalkyl)boranes, (silylalkyl)borazines, oligoborocarbosilazanes, polyborocarbosilazanes and high

temperature-stable silicon boron carbide nitride ceramics  
 IN Jansen, Martin; Jaeschke, Thomas  
 PA Max-Planck-Gesellschaft zur Foerderung der Wissenschaften E.V., Germany  
 SO PCT Int. Appl., 46 pp.  
 CODEN: PIXXD2  
 DT Patent  
 LA German  
 FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2002022625	A1	20020321	WO 2001-EP10540	20010912
	W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW				
	RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
	DE 10045050	A1	20020321	DE 2000-10045050	20000912
	DE 10108069	A1	20020822	DE 2001-10108069	20010220
	AU 2001087731	A	20020326	AU 2001-87731	20010912
	CA 2421655	A1	20030307	CA 2001-2421655	20010912
	EP 1317463	A1	20030611	EP 2001-967334	20010912
	EP 1317463	B1	20050323		
	R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR				
	JP 2004509127	T	20040325	JP 2002-526876	20010912
	AT 291580	T	20050415	AT 2001-967334	20010912
	ES 2236299	T3	20050716	ES 2001-967334	20010912
	US 20040039217	A1	20040226	US 2003-380553	20030312
	US 7148368	B2	20061212		
	US 20070063396	A1	20070322	US 2006-555934	20061102
	US 7342123	B2	20080311		
PRAI	DE 2000-10045050	A	20000912		
	DE 2001-10108069	A	20010220		
	US 2000-380553	A3	20000312		
	WO 2001-EP10540	W	20010912		
	US 2003-380553	A3	20030312		
OS	CASREACT 136:247699; MARPAT 136:247699				
GI					



AB (silylalkyl)boranes R3SiC(R1)(R2)BR2 [R = H, halo, C1-20 hydrocarbyl, NR'R'', OR', where R', R'' = H, C1-20 hydrocarbyl; R1, R2 = H, halo, C1-20 hydrocarbyl, NR'R'', OR' (same R', R'')] are prepared by reaction of silanes R3SiC(R1)(R2)X (same R-R2, X = halogen), preferably R3SiCH2C1, with a metal M, preferably Mg, at <50° in an

aprotic, organic solvent to give R3SiC(R1)(R2)MXw (w = 0 when M = monovalent metal; w = whole number  $\geq 1$  corresponding to the valence of M - 1, when M is a polyvalent metal), which then reacts at  $<50^\circ$  with a borane YBR2 (same R; Y = halo, NR'R'', OR', same R', R''). Also claimed are (silylalkyl)borazines I [R1 = H, halo, C1-20 hydrocarbyl, NR'R'', OR'; R', R'' = H, C1-20 hydrocarbyl; R2, R3 = H, halo, NR'R'', OR' (same R', R'')]; R4 = R1, SnR\*3, SiR\*3, R\* = R2, C1-20 hydrocarbyl] and their preparation from the corresponding R3SiC(R1)(R2)BR2 and amines NR43 or ammonium salts HNR43+A- (same R4; A = anion), as are oligoborocarbosilazanes and polyborocarbosilazanes and their preparation from R3SiC(R1)(R2)BR2 or borazines I, and also Si B carbide nitride ceramics and their preparation from these compds. and NH3. In an example, 7.0 g powdered Mg in 150 mL Et2O is treated with 36.9 g Cl3SiCH2Cl in 200 mL Et2O, then cooled to  $-78^\circ$  and treated with 23.3 g (EtO)2BCl and filtered, whereupon the solvent is evaporated and the residue treated with 57.2 g BCl3 at  $-78^\circ$  and then with 0.5 g AlCl3 at room temperature to give Cl3SiCH2BCl2; reaction of this (silylalkyl)borane with MeNH2 in hexane gave a polyborocarbosilazane.

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD  
ALL CITATIONS AVAILABLE IN THE RE FORMAT

=> D HIS

(FILE 'HOME' ENTERED AT 16:59:48 ON 23 JUN 2009)

FILE 'CAPLUS' ENTERED AT 17:00:17 ON 23 JUN 2009

L1 1 S US2006-544211/AP

FILE 'STNGUIDE' ENTERED AT 17:01:31 ON 23 JUN 2009

FILE 'STNGUIDE' ENTERED AT 17:02:11 ON 23 JUN 2009

L2 0 S US2006-0293164/AP  
L3 0 S US20060293164/PN  
L4 0 S US2006-0293164/PN  
L5 0 S METHOD FOR PRODUCTION OF B/N/C/SI CERAMIC/TI  
L6 0 S "METHOD FOR PRODUCTION OF B/N/C/SI CERAMIC"/TI  
L7 0 S NESPIER R?/AU  
L8 0 S NESPER R?/AU

FILE 'CAPLUS' ENTERED AT 17:05:11 ON 23 JUN 2009

L9 0 S "METHOD FOR PRODUCTION OF B/N/C/SI CERAMIC"/TI  
L10 240 S NESPER R?/AU  
L11 95 S GRUTZMACHER H?/AU  
L12 0 S HABRECHT J?/AU  
L13 13 S HABERECHT J?/AU  
L14 1 S US 2005-544211/AP  
SET SMA OFF  
SEL RAN.CAPLUS(1) L14 1  
SET SMA LOGIN  
L15 1 S E1  
SET SMA OFF  
SEL RAN.CAPLUS(2) L14 1  
SET SMA LOGIN  
L16 1 S E2

=> SEL L14 RN  
E3 THROUGH E11 ASSIGNED

=> FILE REGISTRY		
COST IN U.S. DOLLARS	SINCE FILE	TOTAL
	ENTRY	SESSION
FULL ESTIMATED COST	66.70	71.83
DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)	SINCE FILE	TOTAL
	ENTRY	SESSION
CA SUBSCRIBER PRICE	-1.64	-1.64

FILE 'REGISTRY' ENTERED AT 17:12:57 ON 23 JUN 2009  
 USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.  
 PLEASE SEE "HELP USAGETERMS" FOR DETAILS.  
 COPYRIGHT (C) 2009 American Chemical Society (ACS)

Property values tagged with IC are from the ZIC/VINITI data file  
 provided by InfoChem.

STRUCTURE FILE UPDATES: 22 JUN 2009 HIGHEST RN 1159446-15-7  
 DICTIONARY FILE UPDATES: 22 JUN 2009 HIGHEST RN 1159446-15-7

New CAS Information Use Policies, enter HELP USAGETERMS for details.

TSCA INFORMATION NOW CURRENT THROUGH January 9, 2009.

Please note that search-term pricing does apply when  
 conducting SmartSELECT searches.

REGISTRY includes numerically searchable data for experimental and  
 predicted properties as well as tags indicating availability of  
 experimental property data in the original document. For information  
 on property searching in REGISTRY, refer to:

<http://www.cas.org/support/stngen/stdoc/properties.html>

=> S E3-11

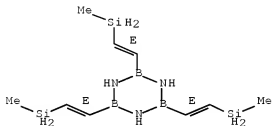
1 10025-78-2/BI  
 (10025-78-2/RN)  
 1 12656-55-2/BI  
 (12656-55-2/RN)  
 1 153498-18-1/BI  
 (153498-18-1/RN)  
 1 635685-17-5/BI  
 (635685-17-5/RN)  
 1 64477-28-7/BI  
 (64477-28-7/RN)  
 1 664312-04-3/BI  
 (664312-04-3/RN)  
 1 736156-97-1/BI  
 (736156-97-1/RN)  
 1 736156-98-2/BI  
 (736156-98-2/RN)  
 1 736156-99-3/BI  
 (736156-99-3/RN)

L17 9 (10025-78-2/BI OR 12656-55-2/BI OR 153498-18-1/BI OR 635685-17-5  
 /BI OR 64477-28-7/BI OR 664312-04-3/BI OR 736156-97-1/BI OR 7361  
 56-98-2/BI OR 736156-99-3/BI)

=> D L17 1-9

L17 ANSWER 1 OF 9 REGISTRY COPYRIGHT 2009 ACS on STN  
 RN 736156-99-3 REGISTRY  
 ED Entered STN: 31 Aug 2004  
 CN Borazine, 2,4,6-tris[(1E)-2-(methylsilyl)ethenyl]- (CA INDEX NAME)  
 FS STEREOSEARCH  
 MF C9 H24 B3 N3 Si3  
 SR CA  
 LC STN Files: CA, CAPLUS, USPATFULL

Double bond geometry as shown.

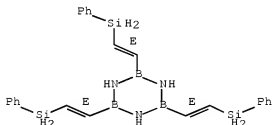


\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)  
 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L17 ANSWER 2 OF 9 REGISTRY COPYRIGHT 2009 ACS on STN  
 RN 736156-98-2 REGISTRY  
 ED Entered STN: 31 Aug 2004  
 CN Borazine, 2,4,6-tris[(1E)-2-(phenylsilyl)ethenyl]- (CA INDEX NAME)  
 FS STEREOSEARCH  
 MF C24 H30 B3 N3 Si3  
 SR CA  
 LC STN Files: CA, CAPLUS, USPATFULL

Double bond geometry as shown.



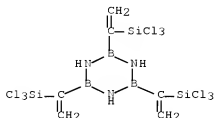
\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)  
 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L17 ANSWER 3 OF 9 REGISTRY COPYRIGHT 2009 ACS on STN  
 RN 736156-97-1 REGISTRY



ED Entered STN: 31 Aug 2004  
 CN Borazine, 2,4,6-tris[1-(trichlorosilyl)ethenyl]- (CA INDEX NAME)  
 MF C6 H9 B3 Cl9 N3 Si3  
 SR CA  
 LC STN Files: CA, CAPLUS, USPATFULL

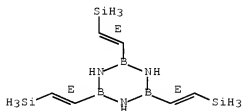


\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)  
 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L17 ANSWER 4 OF 9 REGISTRY COPYRIGHT 2009 ACS on STN  
 RN 664312-04-3 REGISTRY  
 ED Entered STN: 18 Mar 2004  
 CN Borazine, 2,4,6-tris[(1E)-2-silylethenyl]- (CA INDEX NAME)  
 FS STEREOSEARCH  
 MF C6 H18 B3 N3 Si3  
 SR CA  
 LC STN Files: CA, CAPLUS, USPATFULL

Double bond geometry as shown.



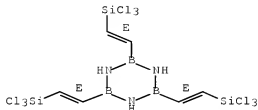
\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

2 REFERENCES IN FILE CA (1907 TO DATE)  
 2 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L17 ANSWER 5 OF 9 REGISTRY COPYRIGHT 2009 ACS on STN  
 RN 635685-17-5 REGISTRY  
 ED Entered STN: 09 Jan 2004  
 CN Borazine, 2,4,6-tris[(1E)-2-(trichlorosilyl)ethenyl]- (CA INDEX NAME)  
 FS STEREOSEARCH  
 MF C6 H9 B3 Cl9 N3 Si3  
 CI COM  
 SR CA

LC STN Files: CA, CAPLUS, CASREACT, USPATFULL

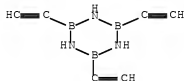
Double bond geometry as shown.



\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

5 REFERENCES IN FILE CA (1907 TO DATE)  
1 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA  
5 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L17 ANSWER 6 OF 9 REGISTRY COPYRIGHT 2009 ACS on STN  
RN 153498-18-1 REGISTRY  
ED Entered STN: 08 Mar 1994  
CN Borazine, 2,4,6-triethynyl- (CA INDEX NAME)  
DR 1013036-42-4  
MF C6 H6 B3 N3  
CI COM  
SR CA  
LC STN Files: CA, CAPLUS, CASREACT, TOXCENTER, USPATFULL



\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

11 REFERENCES IN FILE CA (1907 TO DATE)  
11 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L17 ANSWER 7 OF 9 REGISTRY COPYRIGHT 2009 ACS on STN  
RN 64477-28-7 REGISTRY  
ED Entered STN: 16 Nov 1984  
CN Silicon carbide nitride (CA INDEX NAME)  
OTHER NAMES:  
CN Silicon carbonitride  
DR 207853-72-3  
MF C . N . Si  
CI TIS  
LC STN Files: CA, CAPLUS, CASREACT, CBNB, CIN, PIRA, PROMT, TOXCENTER, USPAT2, USPATFULL, USPATOLD

Component	Ratio	Component
		Registry Number
N	x	17778-88-0
C	x	7440-44-0
Si	x	7440-21-3

\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1835 REFERENCES IN FILE CA (1907 TO DATE)  
 9 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA  
 1839 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L17 ANSWER 8 OF 9 REGISTRY COPYRIGHT 2009 ACS on STN  
 RN 12656-55-2 REGISTRY  
 ED Entered STN: 16 Nov 1984  
 CN Boron carbide nitride (CA INDEX NAME)  
 OTHER NAMES:  
 CN Boron carbide nitride (B0-1C0-1N0-1)  
 CN Boron carbon nitride  
 CN Boron carbonitride  
 CN Carbon boron nitride  
 DR 1093859-24-5, 37293-18-8, 157661-35-3, 220914-48-7, 249563-28-8,  
 347356-48-3  
 MF Unspecified  
 CI COM, MAN  
 LC STN Files: ANABSTR, CA, CAPLUS, CIN, IFICDB, IFIPAT, IFIUDB, TOXCENTER,  
 USPAT2, USPATFULL, USPATOLD

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

715 REFERENCES IN FILE CA (1907 TO DATE)  
 4 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA  
 717 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L17 ANSWER 9 OF 9 REGISTRY COPYRIGHT 2009 ACS on STN  
 RN 10025-78-2 REGISTRY  
 ED Entered STN: 16 Nov 1984  
 CN Silane, trichloro- (CA INDEX NAME)  
 OTHER NAMES:  
 CN Silicochloroform  
 CN Silicon chloride hydride (SiCl3H)  
 CN Silicon chloride hydride (SiHCl3)  
 CN Trichloromonosilane  
 CN Trichlorosilane  
 CN Trichlorosilane (HSiCl3)  
 CN Trichlorosilane (SiHCl3)  
 MF Cl3 H Si  
 CI COM  
 LC STN Files: AGRICOLA, ANABSTR, BIOSIS, CA, CAPLUS, CASREACT, CBNB,  
 CHEMCATS, CHEMINFORMRX, CHEMLIST, CHEMSAFE, CIN, CSCHEM, CSNB, DETHERM\*,  
 GMELIN\*, HSDB\*, IFICDB, IFIPAT, IFIUDB, MEDLINE, MRCK\*, MSDS-OHS, PIRA,  
 PROMT, RTECS\*, TOXCENTER, USPAT2, USPATFULL, USPATOLD  
 (\*File contains numerically searchable property data)  
 Other Sources: DSL\*\*, EINECS\*\*, TSCA\*\*  
 (\*\*Enter CHEMLIST File for up-to-date regulatory information)



\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

5216 REFERENCES IN FILE CA (1907 TO DATE)  
269 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA  
5228 REFERENCES IN FILE CAPLUS (1907 TO DATE)

=> LOG HOLD

(FILE 'HOME' ENTERED AT 16:59:48 ON 23 JUN 2009)

FILE 'CAPLUS' ENTERED AT 17:00:17 ON 23 JUN 2009

L1 1 SEA FILE=CAPLUS SPE=ON PLU=ON US2006-544211/AP  
D L1

FILE 'STNGUIDE' ENTERED AT 17:01:31 ON 23 JUN 2009

FILE 'STNGUIDE' ENTERED AT 17:02:11 ON 23 JUN 2009

L2 0 SEA FILE=STNGUIDE SPE=ON PLU=ON US2006-0293164/AP  
L3 0 SEA FILE=STNGUIDE SPE=ON PLU=ON US20060293164/PN  
L4 0 SEA FILE=STNGUIDE SPE=ON PLU=ON US2006-0293164/PN  
L5 0 SEA FILE=STNGUIDE SPE=ON PLU=ON METHOD FOR PRODUCTION OF  
B/N/C/SI CERAMIC/TI  
L6 0 SEA FILE=STNGUIDE SPE=ON PLU=ON "METHOD FOR PRODUCTION OF  
B/N/C/SI CERAMIC"/TI  
L7 0 SEA FILE=STNGUIDE SPE=ON PLU=ON NESPIER R?/AU  
L8 0 SEA FILE=STNGUIDE SPE=ON PLU=ON NESPER R?/AU

FILE 'CAPLUS' ENTERED AT 17:05:11 ON 23 JUN 2009

L9 0 SEA FILE=CAPLUS SPE=ON PLU=ON "METHOD FOR PRODUCTION OF  
B/N/C/SI CERAMIC"/TI  
L10 240 SEA FILE=CAPLUS SPE=ON PLU=ON NESPER R?/AU  
L11 95 SEA FILE=CAPLUS SPE=ON PLU=ON GRUTZMACHER H?/AU  
L12 0 SEA FILE=CAPLUS SPE=ON PLU=ON HABREACHT J?/AU  
L13 13 SEA FILE=CAPLUS SPE=ON PLU=ON HABERECHT J?/AU  
D L13 1-13  
L14 1 SEA FILE=CAPLUS SPE=ON PLU=ON US 2005-544211/AP  
D L14  
D RE  
SET SMA OFF  
SEL RAN.CAPLUS(1) L14 1  
SET SMA LOGIN  
L15 1 SEA FILE=CAPLUS SPE=ON PLU=ON "2002:220601"/AN  
D L15 BIB,ABS  
SET SMA OFF  
SEL RAN.CAPLUS(2) L14 1  
SET SMA LOGIN  
L16 1 SEA FILE=CAPLUS SPE=ON PLU=ON "2002:220601"/AN  
D L16 BIB,ABS  
SEL L14 RN

FILE 'REGISTRY' ENTERED AT 17:12:57 ON 23 JUN 2009

L17 9 SEA FILE=REGISTRY SPE=ON PLU=ON (10025-78-2/BI OR 12656-55-2/

BI OR 153498-18-1/BI OR 635685-17-5/BI OR 64477-28-7/BI OR  
664312-04-3/BI OR 736156-97-1/BI OR 736156-98-2/BI OR 736156-99  
-3/BI)  
D L17 1-9

COST IN U.S. DOLLARS	SINCE FILE	TOTAL
	ENTRY	SESSION
FULL ESTIMATED COST	19.89	91.72
DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)	SINCE FILE	TOTAL
	ENTRY	SESSION
CA SUBSCRIBER PRICE	0.00	-1.64

SESSION WILL BE HELD FOR 120 MINUTES  
STN INTERNATIONAL SESSION SUSPENDED AT 17:14:47 ON 23 JUN 2009